

Amendments to the Specification:

Please replace paragraph [295] with the following rewritten paragraph:

[295] The advantage of excellent control over ion implant flux is illustrated in the graph of FIG. 100, in which electron density is plotted as a function of source power level for the torroidal source PIII reactor of FIG. 85 and for an inductively coupled PIII reactor of the type illustrated in FIG. 79. Electron density is an indicator of plasma ion density and therefore of the ion implant flux or implant dose to the wafer. The inductively coupled source of the PIII reactor of FIG. 79 tends to have a highly non-linear response of electron density to applied source power, exhibiting a sudden increase in electron density at a threshold power level, PICP, below which the slope (response) is negligible and above which the slope (response) is so steep that electron density (and therefore ion implant flux or dose) is nearly impossible to control to any fine degree. In contrast the torroidal source PIII reactor of FIG. 85 has a generally linear and gradual response of electron density to source power level above a threshold power level PTH, so that ion implant flux (dose) is readily controlled to within a very fine accuracy even at very high source power level. It should be noted here that the plasma source power level of the torroidal source PIII reactor of FIG. 85 is a function of the two different source power generators 8055, 8056 coupled to the respective reentrant conduits 8150, 8151. The source power frequency may be about 13.56 MHz, although the frequency of each of the two source power generators 8055, 8056 are offset from this frequency (13.56 MHz) by +100 kHz and -100 kHz, respectively, so that the two torroidal plasma current paths established by the sources 8110 and 8111 are decoupled from one another by being de-tuned from one

another by about 200 kHz. However, their power levels may be generally about the same. Operating frequencies are not limited to the regime described here, and another RF frequency and frequency offset may be selected for the pair of RF source power generators 8055, ~~5056~~ 8056.

Please replace paragraph [343] with the following rewritten paragraph:

[343] Finally, SOI transistors are formed in the epitaxial silicon layer (block 5500 of FIG. 119), the resulting transistor structures being illustrated in FIG. 120F. The fabrication of the transistors of FIGS. 120F may be carried out as described earlier in this specification with reference to the process of FIG. 112. In FIG. 120F, each transistor ~~5510~~ 5509 is formed in the silicon layer 5217 and has a source ~~5520~~ 5519, a drain 5540 and a gate 5560, on which are formed respective metal silicide contacts 5521, 5541, 5561.